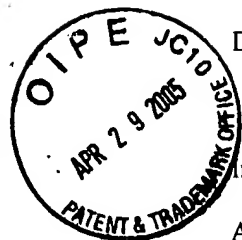


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J



DOCKET No.: MS150900.12 / MSFTP223USB

**IN THE UNITED STATES PATENT AND TRADEMARK OFFICE**

In re patent application of

Applicant: **Eric J. Horvitz**  
Serial No.: **09/881,502**  
Filed: **June 14, 2001**  
For: **BOUNDED DEFERRAL POLICIES FOR REDUCING THE DISRUPTIVENESS OF NOTIFICATIONS**  
Art Unit: **2174**  
Examiner: **Peng Ke**

**SUPPLEMENTAL INFORMATION DISCLOSURE STATEMENT**

Commissioner for Patents  
P.O. Box 1450  
Alexandria, Virginia 22313-1450

Sir:

1. Pursuant to 37 C.F.R. 1.97 and 1.98, and in compliance with 37 C.F.R. 1.56, the Office's attention is directed to the patents, publications and other information listed on the attached PTO-1449. A copy of each listed document is enclosed except for: (a) pending applications or (b) those previously cited or submitted to the Office in the following application(s) upon which this application relies for an earlier filing date under 35 U.S.C. 120; or (c) U.S. Patent(s) and published applications(s) since the subject application was filed after June 30, 2003.

Serial No.: \_\_\_\_\_  
Filing Date: \_\_\_\_\_

Regarding any document, publication or other information for which a date is not given on the attached PTO-1449, Applicant(s) believe(s) the same may qualify as "prior" art to this application and should be treated accordingly, although Applicant(s) reserve(s) the right to contest the prior art status of any document, publication or information, should issue arise.

2. Regarding each listed document that is not in the English language, an English-language translation accompanies this Statement as indicated on the attached PTO-1449 or a concise explanation of the relevance of the document is set forth in the following document(s):

- (a) ☐ Copy of each English language version of a search report indicating the degree of relevance found by the foreign office of each document being submitted from the search report.
- (b) ☐ Attachment entitled "Concise Explanation of Relevance of Non-English Language Documents".

3. Pursuant to 37 C.F.R. 1.97(b) this Statement is being filed (one must be checked):

- (a) ☐ Within 3 months of the filing date or date of entry into the National Stage.
- (b) ☐ Before the mailing date of a first Office Action on the merits. If this Statement is not filed before the mailing date of a first Office Action on the merits, the required certification is given below or, in the absence thereof, the Office is authorized to charge the required fee set forth in 37 C.F.R. 1.17(p) to Deposit Account No. 50-1063 for consideration of this Statement.

(c) ☒ After the period set forth in 37 C.F.R. 1.97(b) but before the mailing date of either a final action or a notice of allowance.

(1) \_\_\_ The required certification is given below, or

(2) \_\_\_ Enclosed is a check covering the fee set forth in 37 C.F.R. 1.17(p) for consideration of this Statement,

(3) ☒ A credit card payment form is filed concurrently herewith in connection with all fees due regarding this document. In the event any addition fees may be due and/or are not covered by the credit card, the Commissioner is authorized to charge such fees to Deposit Account No. 50-1063.

(d) \_\_\_ After the mailing date of either a final action or a notice of allowance, but before payment of the issue fee. Petition hereby is made for consideration of this Statement and the required certification is indicated below.

(1) \_\_\_ Enclosed is a check covering the fee set forth in 37 C.F.R. 1.17(i)(1), or

(2) \_\_\_ Charge the fee set forth in 37 C.F.R. 1.17(i)(1) to Deposit Account No. 50-1063.


4. Certification (if applicable)

(a) \_\_\_ The undersigned hereby certifies that each item of information contained in this Statement was cited in a communication from a foreign patent office in a counterpart foreign application not more than 3 months prior to the filing of this Statement.

(b) \_\_\_ The undersigned hereby certifies that no item of information contained in this Statement was cited in a communication from a foreign patent office in a counterpart foreign application or, to the undersigned's knowledge after making reasonable inquiry, was known to any individual designated in 37 C.F.R. 1.56(c) more than 3 months prior to the filing of this Statement.

Respectfully Submitted,

By



Himanshu S. Amin  
Reg. No. 40,894

24<sup>TH</sup> Floor, National City Center  
1900 East 9<sup>th</sup> Street  
Cleveland, Ohio 44114  
(216) 696-8730

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**SUPPLEMENTAL INFORMATION  
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Application Number	09/881,502
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First Named Inventor	Eric J. Horvitz
Art Unit	2174
Examiner Name	Peng Ke
Attorney Docket Number	MS150900.12/MSFTP223USB

**U. S. PATENT DOCUMENTS**

Examiner Initials*	Cite No. <sup>1</sup>	Document Number	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
		Number-Kind Code <sup>2</sup> (if known)			
		US- 6,513,046	01-28-2003	Abbott, III et al.	
		US- 6,747,675	06-08-2004	Abbott et al.	
		US- 6,801,223	10-05-2004	Abbott et al.	
		US- 6,842,877	01-11-2005	Robarts et al.	
		US- 6,466,232	10-15-2002	Newell et al.	
		US- 6,549,915	04-15-2003	Abbott, III et al.	
		US- 6,791,580	09-14-2004	Abbott et al.	
		US- 6,812,937	11-02-2004	Abbott et al.	
		US- 2001/0040591	11-15-2001	Abbott et al.	
		US- 2001/0043232	11-22-2001	Abbott et al.	
		US- 2002/0044152	04-18-2002	Abbott, III et al.	
		US- 2002/0052963	05-02-2002	Abbott et al.	
		US- 2002/0054174	05-09-2002	Abbott et al.	
		US- 2002/0080155	06-27-2002	Abbott et al.	
		US- 2002/0083025	06-27-2002	Robarts et al.	
		US- 2002/0087525	07-04-2002	Abbott et al.	
		US- 2003/0046401	03-06-2003	Abbott et al.	
		US- 2005/0034078	02-10-2005	Abbott et al.	

**FOREIGN PATENT DOCUMENTS**

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		Country Code <sup>3</sup> Number <sup>4</sup> Kind Code <sup>5</sup> (if known)				

Examiner  
Signature

Date

Considered

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Filing Date	6/14/2001
First Named Inventor	Eric J. Horvitz
Art Unit	2174
Examiner Name	Peng Ke
Attorney Docket Number	MS150900.12/MSFTP223USB

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		US- 2001/0040590	11-15-2001	Abbott et al.	
		US- 2001/0043231	11-22-2001	Abbott et al.	
		US- 2002/0032689	03-14-2002	Abbott, III et al.	
		US- 2002/0052930	05-02-2002	Abbott et al.	
		US- 2002/0054130	05-09-2002	Abbott, III et al.	
		US- 2002/0078204	06-20-2002	Newell et al.	
		US- 2002/0080156	06-27-2002	Abbott et al.	
		US- 2002/0083158	06-27-2002	Abbott et al.	
		US- 2002/0099817	07-25-2002	Abbott et al.	
		US- 2003/0154476	08-14-2003	Abbott, III et al.	
		US- 5,603,054	02-11-1997	Theimer et al.	
		US- 5,555,376	09-10-1996	Theimer et al.	
		US- 5,611,050	03-11-1997	Theimer et al.	
		US- 5,544,321	08-06-1996	Theimer et al.	
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**FOREIGN PATENT DOCUMENTS**

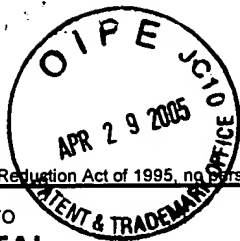
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**SUPPLEMENTAL  
INFORMATION DISCLOSURE  
STATEMENT BY APPLICANT**

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**Complete if Known**

Application Number	09/881,502
Filing Date	6/14/2001
First Named Inventor	Eric J. Horvitz
Art Unit	2174
Examiner Name	Peng Ke
Attorney Docket Number	MS150900.12/MSFTP223USB

Sheet	3	of	5
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**NON PATENT LITERATURE DOCUMENTS**

Examiner Initials*	Cite No. <sup>1</sup>	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published.	T <sup>2</sup>
		ANDY HARTER, et al., A Distributed Location System for the Active Office, IEEE Network, 1994, pp. 62-70.	
		GUANLING CHEN, et al., A Survey of Context-Aware Mobile Computing Research, Dartmouth Computer Science Technical Report, 2000, 16 pages.	
		WILLIAM NOAH SCHILIT, A System Architecture for Context-Aware Mobile Computing, Columbia University, 1995, 153 pages.	
		MIKE SPREITZER, et al., Providing Location Information in a Ubiquitous Computing Environment, SIGOPS '93, 1993, pp.270-283.	
		MARVIN THEIMER, et al., Operating System Issues for PDAs, In Fourth Workshop on Workstation Operating Systems, 1993, 7 pages.	
		ROY WANT, Active Badges and Personal Interactive Computing Objects, IEEE Transactions on Consumer Electronics, 1992, 11 pages, Vol. 38 - No. 1.	
		BILL N. SCHILIT, et al., The ParcTab Mobile Computing System, IEEE WWOS-IV, 1993, 4 pages.	
		BILL SCHILIT, et al., Context-Aware Computing Applications, In Proceedings of the Workshop on Mobile Computing Systems and Applications, December 1994. pp. 85-90.	
		BILL N. SCHILIT, et al., Customizing Mobile Applications, Proceedings USENIX Symposium on Mobile and Location Independent Computing, August 1993, 9 pages.	
		MIKE SPREITZER, et al., Architectural Considerations for Scalable, Secure, Mobile Computing with Location Information, In The 14th International Conference on Distributed Computing Systems, June 1994. pages 29-38.	

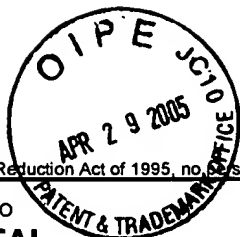
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		ROY WANT, et al., The Active Badge Location System, ACM Transactions on Information Systems, January 1992, pp. 91-102, Vol. 10 - No. 1.	
		MARK WEISER, Some Computer Science Issues in Ubiquitous Computing, Communications of the ACM, July 1993, pp. 75-84, Vol. 36 - No. 7.	
		M. BILLINGHURST, et al., An Evaluation of Wearable Information Spaces, Proceedings of the Virtual Reality Annual International Symposium, 1998, 8 pages.	
		BRADLEY J. RHODES, Remembrance Agent: A continuously running automated information retrieval system, The Proceedings of The First International Conference on The Practical Application Of Intelligent Agents and Multi Agent Technology, 1996, pp. 487-495.	
		ERIC HORVITZ, et al., In Pursuit of Effective Handsfree Decision Support: Coupling Bayesian Inference, Speech Understanding, and User Models, 1995, 8 pages.	
		BRADLEY J. RHODES, The Wearable Remembrance Agent: A System for Augmented Theory, The Proceedings of The First International Symposium on Wearable Computers, October 1997, pp. 123-128.	
		ERIC HORVITZ, et al., Attention-Sensitive Alerting in Computing Systems, Microsoft Research, August 1999.	
		BILL N. SCHILIT, et al., Disseminating Active Map Information to Mobile Hosts, IEEE Network, 1994, pages 22-32, Vol. 8 - No. 5.	
		MARK BILLINGHURST, et al., Wearable Devices: New Ways to Manage Information, IEEE Computer Society, January 1999, pp. 57-64.	

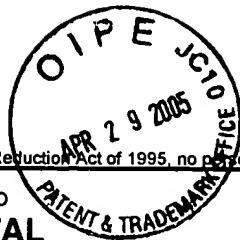
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		BRADLEY J. RHODES, The Wearable Remembrance Agent: A System for Augmented Memory, Personal Technologies Journal Special Issue on Wearable Computing, 1997, 12 pages.	
		Workshop on Wearable Computing Systems, August 19-21, 1996.	
		MARK BILLINGHURST, Research Directions in Wearable Computing, University of Washington, May, 1998, 48 pages.	
		Mark Weiser, The Computer for the 21st Century, Scientific American, September 1991, pp. 94-104, Vol. 265 - No. 3.	

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